



## Biology Toolkit: Indicator 1.4.9

Student Handout: Biology: Indicator 1.4.9

### Goal 1.0 Skills And Processes

Expectation 1.4 The student will demonstrate that data analysis is a vital aspect of the process of scientific inquiry and communication.

Indicator 1.4.9 The student will use analyzed data to confirm, modify, or reject a hypothesis.

### Public Release - Selected Response Item - Released in 2008

Biology Indicator 1.4.9

A scientist hypothesizes that homing pigeons use their sense of smell to find their way home. She tests this idea on two groups of pigeons. She releases the pigeons in Group 1 and records the direction of their flight.

The pigeons in Group 2 are given a substance that blocks their sense of smell for a short time. The scientist then releases them and records the direction of their flight. Her data are shown on the diagram below.

From these results, what can be concluded about the scientist's hypothesis?

- A. It is supported by the data.
- B. It must be modified and tested again.
- C. It is not supported by the data.
- D. It can be applied to all bird species.

Correct Answer

- A. It is supported by the data.

## Item

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